UNITED STATES ENVIRONMENTAL PROTECTION AGENCY OFFICE OF CRIMINAL ENFORCEMENT, FORENSICS AND TRAINING

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Compliance-Focused Environmental Management System - Enforcement Agreement Guidance

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INTRODUCTION

Since the late 1980s, civil multimedia compliance investigations conducted by the EPA National Enforcement Investigations Center (NEIC) have increasingly involved identifying causes of observed noncompliance. In a significant number of cases, the causes arise from inadequate environmental management systems (EMSs). NEIC, in response, developed key elements for a compliance-focused EMS (CFEMS) model, which have been used as the basis for EMS requirements in several settlement agreements. The purpose of this guidance is to present those key elements and to show, through the attached example, how they can be incorporated into a settlement agreement.

To achieve maximum benefit from the CFEMS elements, the overall EMS in which they are incorporated should embody the "plan, do, check, and act" model for continuous improvement. Consequently, the compliance-focused EMS model described here is intended to supplement, not replace, EMS models developed by voluntary consensus standards bodies, such as the ISO 14001 EMS standard developed by the International Organization for Standardization.

A settlement agreement that requires an EMS should include a requirement that the organization conduct an initial review of its current EMS, followed by development of a comprehensive CFEMS that must be documented in a manual. The EMS manual must contain policies, procedures, and standards for the 12 key elements, at a minimum, and should also identify other, more detailed procedures and processes (e.g., inspections and self-monitoring) that may be located elsewhere at the facility. After the organization has had sufficient time to implement and refine the EMS (usually 2 to 3 years), the agreement should require at least one EMS audit by an

The International Organization for Standardization (ISO) defines an EMS as "that part of the overall management system which includes organizational structure, planning activities, responsibilities, practices, procedures, processes and resources for developing, implementing, achieving, reviewing, and maintaining [the organization's] environmental policy." The EMS provides the structure by which specific activities related to environmental protection and compliance can be effectively and efficiently carried out.

independent third-party auditor, with results reported to both the organization and EPA. However, additional audits may be required, as individual circumstances dictate.

The intended result of this approach is twofold: first, to have the organization develop an EMS that will both improve its compliance with applicable environmental requirements and, second, to improve its environmental performance by achieving the organization's environmental targets and objectives.

The 12 key elements of a CFEMS addressed in this guide were compiled from a number of sources: EMS assessment protocols developed by Deloitte and Touche LLP of San Francisco for the Global Environmental Management Initiative (1992) and an industrial client (1994); ISO 14001 "Environmental management systems - Specification with guidance for use" (1996); National Sanitation Foundation EMS standards (NSF 110-1995); a November 14, 1986 EPA memorandum entitled "Final EPA Policy on the Inclusion of Environmental Auditing Provisions in Enforcement Settlements"; and the "due diligence" provisions of the current EPA "audit policy" (60 FR 66710 published December 22, 1996). Additional input was obtained through NEIC participation in several EPA EMS-related work groups including the Environmental Leadership Program (ELP) Pilot Project workgroup tasked with defining the EMS requirements for the full-scale program.

The current revision involved enhancing several of the elements and more completely incorporating the due diligence provisions of the EPA audit policy. Refinement continues through settlement negotiations, and discussions with EPA staff, EMS consultants, and environmental personnel from several companies with medium-size and large facilities.

A general EMS provision for a settlement agreement and the 12 key elements are presented in the following sections. The prescriptive style has been retained to facilitate future use in

settlement agreements.¹ Example consent decree language incorporating the EMS improvement approach described above is presented in Attachment A.

GENERAL EMS PROVISION

A comprehensive compliance-focused Environmental Management System (EMS) shall be developed, implemented, and maintained by the organization. The EMS shall address, at a minimum, the 12 key elements listed below, and shall be described in an "Environmental Management System Manual."

ENVIRONMENTAL MANAGEMENT SYSTEM MANUAL PROVISIONS

The EMS Manual shall be organized to clearly address the following key elements.

1. Environmental Policy

a. This policy, upon which the EMS is based, must clearly communicate management commitment to achieving compliance with applicable federal, state, and local environmental statutes, regulations, enforceable agreements, and permits (hereafter, "environmental requirements") and continuous improvement in environmental performance. The policy should also state management's intent to provide adequate personnel and other resources for the EMS.

2. Organization, Personnel, and Oversight of EMS

a. Describes, organizationally, how the EMS is implemented and maintained.

The 12 elements are closely inter-related components of an EMS for which subsystems and procedures must be developed and fully integrated if the entire program is to be effective. They are usually included in settlement agreements as a complete group; however, individual elements may need to be modified to reflect site-specific conditions and circumstances.

- b. Includes organization charts that identify units, line management, and other individuals having environmental performance and regulatory compliance responsibilities.
- c. Identifies and defines duties, roles, responsibilities, and authorities of key environmental program personnel in implementing and sustaining the EMS (e.g., could include position descriptions and performance standards for all environmental department personnel, and excerpts from others having specific environmental program and regulatory compliance responsibilities).
- d. Includes ongoing means of communicating environmental issues and information to all organization personnel, on-site service providers, and contractors, and for receiving and addressing their concerns.

3. Accountability and Responsibility

- a. Specifies accountability and responsibilities of organization's management, on-site service providers, and contractors for environmental protection practices, assuring compliance, required reporting to regulatory agencies, and corrective actions implemented in their area(s) of responsibility.
- b. Describes incentive programs for managers and employees to perform in accordance with compliance policies, standards and procedures.
- c. Describes potential consequences for departure from specified operating procedures, including liability for civil/administrative penalties imposed as a result of noncompliance.

4. Environmental Requirements

- a. Describes process for identifying, interpreting, and effectively communicating environmental requirements to affected organization personnel, on-site service providers, and contractors, and ensuring that facility activities conform to those requirements. Specifies procedures for prospectively identifying and obtaining information about changes and proposed changes in environmental requirements, and incorporating those changes into the EMS.
- b. Establishes and describes processes to ensure communication with regulatory agencies regarding environmental requirements and regulatory compliance.

5. Assessment, Prevention, and Control

- a. Identifies an ongoing process for assessing operations, for the purposes of preventing and controlling releases, ensuring environmental protection, and maintaining compliance with statutory and regulatory requirements. This section shall describe monitoring and measurements, as appropriate, to ensure sustained compliance. It shall also include identifying operations and waste streams where equipment malfunctions and deterioration, operator errors, and discharges or emissions may be causing, or may lead to: (1) releases of hazardous waste or other pollutants to the environment, (2) a threat to human health or the environment, or (3) violations of environmental requirements.
- b. Describes process for identifying operations and activities where documented standard operating practices (SOPs) are needed to prevent potential violations or pollutant releases, and defines a uniform process for developing, approving and implementing the SOPs.
- c. Describes a system for conducting and documenting routine, objective, self-inspections by department supervisors and trained staff, especially at locations identified by the process described in a. above.
- d. Describes process for ensuring input of environmental requirements (or concerns) in planning, design, and operation of ongoing, new, and/or changing buildings, processes, maintenance activities, and products.

6. Environmental Incident and Noncompliance Investigations

- a. Describes standard procedures and requirements for internal and external reporting of potential violations and release incidents.
- b. Establishes procedures for investigation, and prompt and appropriate correction of potential violations. The investigation process includes root-cause analysis of identified problems to aid in developing the corrective actions.
- c. Describes a system for development, tracking, and effectiveness verification of corrective and preventative actions.
- d. Each of these procedures shall specify self-testing of such procedures, where practicable.

7. Environmental Training, Awareness, and Competence

- a. Identifies specific education and training required for organization personnel, as well as process for documenting training provided.
- b. Describes program to ensure that organization employees are aware of its environmental policies and procedures, environmental requirements, and their roles and responsibilities within the environmental management system.
- c. Describes program for ensuring that personnel responsible for meeting and maintaining compliance with environmental requirements are competent on the basis of appropriate education, training, and/or experience.

8. Environmental Planning and Organizational Decision-Making

- a. Describes how environmental planning will be integrated into organizational decision-making, including plans and decisions on capital improvements, product and process design, training programs, and maintenance activities.
- b. Requires establishing written targets, objectives, and action plans by at least each operating organizational subunit with environmental responsibilities, as appropriate, including those for contractor operations conducted at the facility, and how specified actions will be tracked and progress reported. Targets and objectives must include achieving and maintaining compliance with all environmental requirements.

9. Maintenance of Records and Documentation

- a. Identifies the types of records developed in support of the EMS (including audits and reviews), who maintains them and where, and protocols for responding to inquiries and requests for release of information.
- b. Specifies the data management systems for any internal waste tracking, environmental data, and hazardous waste determinations.

10. Pollution Prevention Program

a. Describes an internal program for preventing, reducing, recycling, reusing, and minimizing waste and emissions, including procedures to encourage material substitutions. Also includes mechanisms for identifying candidate materials to be addressed by program and tracking progress.

11. Continuing Program Evaluation and Improvement

- a. Describes program for periodic (at least annually) evaluation of the EMS, including incorporating the results of the assessment into program improvements, revisions to the manual, and communicating findings and action plans to affected employees, onsite service providers, and contractors.
- b. Describes a program for ongoing evaluation of facility compliance with environmental requirements, and should specify periodic compliance audits by an independent auditor(s). Audit results are reported to upper management and potential violations are addressed through the process described in element 6 above.

12. Public Involvement/Community Outreach

a. Describes a program for ongoing community education and involvement in the environmental aspects of the organization's operations and general environmental awareness.

ATTACHMENT A

EXAMPLE CONSENT DECREE LANGUAGE FOR EMS IMPROVEMENTS

Attachment A

EXAMPLE CONSENT DECREE LANGUAGE FOR EMS IMPROVEMENTS

A. Environmental Management System

- 1. Upon the effective date of this Decree, Defendant shall provide to EPA and the state in writing the name, affiliation and address of the individual(s) selected by the Defendant to conduct the Initial EMS Review and Evaluation, how such individual(s) satisfies the proficiency criteria described in the [reference standard, e.g., ISO 14012 "Guidelines for environmental auditing Qualification criteria for environmental auditors" or American Society for Testing of Materials ("ASTM") Provisional Standard 12-95 Provisional Standard Guide for Study and Evaluation of An Organizations Environmental Management Systems], and the schedule, including milestones, for conducting the Initial EMS Review and Evaluation.
- 2. The individual identified pursuant to paragraph A.1 above shall conduct an initial review and evaluation of the current EMS relating to the operations of both [the company] and Contractors, as defined in paragraph A.17 below. The Defendant shall review and evaluate the current EMS to identify gaps using the elements set forth in paragraphs A.4.a(1) through (12) below.
- 3. Based on the Initial Review and Evaluation results and other information, Defendant shall prepare a written Comprehensive EMS for the Facility¹ addressing, at a minimum, the twelve key elements presented in paragraphs A.4.a(1) through (12) below. The purpose of preparing the Comprehensive EMS is to assist [the company] in its program to comply with federal, state and local environmental statutes,

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[&]quot;Facility" is a defined term in each settlement agreement.

regulations, permits, and enforceable agreements (hereinafter in this Section A (Environmental Management System) referred to as "environmental requirements").

- 4. Within two hundred seventy (270) days of the effective date of this Decree, Defendant shall complete the preparation of an "Environmental Management System Manual" which shall include the Comprehensive EMS, an EMS implementation schedule and rationale identifying proposed changes to the current EMS and explaining what the changes are intended to accomplish. For each of the elements identified in paragraphs A.4.a(1) through (12) below, as appropriate, the manual shall provide a detailed blueprint of the EMS, describing how the activity or program is or will be: (a) established as a formal system, (b) integrated into ongoing department operations, and (c) continuously evaluated and improved.
 - a. Defendant shall develop an Environmental Management System Manual The EMS Manual shall address the following elements:

NOTE: The 12 key elements of the compliance-focused EMS (or alternate standard) are inserted here.

- 5. Defendant shall submit the complete Environmental Management System Manual to EPA and the state for review and comment within thirty (30) days of its completion.
- 6. EPA will provide its and the state's comments on the Environmental Management System Manual within ninety (90) days of EPA's receipt of such Manual unless EPA or the state notifies the Defendant in writing that additional time for review and approval is required. The state's review and EPA's review and comment will not

extend beyond one hundred and fifty (150) days of EPA's receipt of the Environmental Management System Manual.

- 7. [The company] shall, within thirty (30) days of receipt of EPA's and the state's comments on the proposed EMS Manual, submit to EPA and the state a supplement to the EMS Manual or a written response, as appropriate, addressing EPA's and the state's comments. The EMS Manual shall contain an implementation schedule for initiating each component of the system not already implemented.
- 8. Within thirty (30) days of completing their reviews, EPA and the state will return the supplement or written response, and the EMS Manual to the Defendant.
- 9. Upon Defendant's receipt of EPA's and the state's comments, Defendant shall immediately commence implementation of the EMS in accordance with the schedule contained in the EMS Manual. The Defendant shall submit status reports regarding the implementation to EPA and the state, on a quarterly basis, beginning no later than thirty (30) days from receipt of EPA's and the state's comments on the manual. The status reports shall be due on the 15th day of the first month of the next quarter and every quarter thereafter until implementation is complete.
- 10. Within twenty (20) months of the effective date of this Decree, the Defendant shall provide to EPA and the state in writing (1) the name, affiliation, and address of the independent 3rd party consultant selected by the defendant to perform a Comprehensive EMS Review and Evaluation at the Facility; (2) how the selected independent 3rd party consultant satisfies the independence and proficiency criteria in the [reference standard, e.g., ISO 14012 "Guidelines for environmental auditing—Qualification criteria for environmental auditors" American Society for Testing of Materials (ASTM) Provisional Standard 12-95 Provisional Standard Guide for

Study and Evaluation of An Organizations Environmental Management Systems]; and (3) a schedule, including milestones, for conducting the review. The review shall be performed in accordance with the **[reference standard**, e.g., ISO 14011 "Guidelines for environmental auditing - Audit procedures - Auditing of environmental management systems", or ASTM Provisional Standard 12-95 - Provisional Standard Guide for Study and Evaluation of An Organizations Environmental Management Systems]. The Defendant's contract with the 3rd party consultant shall require such 3rd party consultant to review and evaluate the implementation of the systems, policies, and procedures described in the EMS Manual, using the EMS elements set forth in paragraphs A.4.a(1) through (12) above as criteria for the evaluation.

- 11. Within ninety (90) days after submitting the notification required by Paragraph A.10, above, the independent 3rd party consultant shall complete the Comprehensive EMS Review and Evaluation and submit a Comprehensive EMS Review and Evaluation Report to [the company], EPA and the state, simultaneously. This report shall include (1) the results of the auditor's review and evaluation of the facility EMS relating to both [the company] and Contractor operations and (2) the auditor's recommendations for improvements to the Comprehensive EMS.
- 12. Within thirty (30) days after receipt of the independent 3rd party consultant Comprehensive EMS Review and Evaluation Report, Defendant shall provide to EPA and the state for review and comment a written response to the recommendations presented in that Report identifying those recommendations it does and does not intend to implement and/or plans to implement with modification(s). The Defendant shall include in its response an explanation of its rationale for not implementing and/or modifying the independent 3rd party consultant

recommendations and a schedule for implementing changes to the EMS based on the Comprehensive EMS Review and Evaluation.

- 13. EPA will provide its and the state's comments on the Comprehensive EMS Review and Evaluation Report within ninety (90) days of EPA's receipt of such Plan unless EPA or the state notifies the Defendant in writing that additional time for review and comment is required. The state's review and EPA's review and comment will not extend beyond one hundred and fifty (150) days of EPA's receipt of the Comprehensive EMS Review and Evaluation Report.
- 14. [The company] shall, within thirty (30) days of receipt of EPA's and the state's comments on the Comprehensive EMS Review and Evaluation Report, submit to EPA and the state a written response to such comments.
- 15. Within thirty (30) days of completing their review of the Defendant's response to EPA's and the state's comments, EPA and the state will return the Comprehensive EMS Review and Evaluation Report to the Defendant.
- 16. Any submissions made to EPA or the state pursuant to this Section A shall not be interpreted as a waiver or limitation of the United state's or the state of [state name] authority to enforce any federal, state, or local statute or regulation including permits.
- 17. For purposes of this Environmental Management System section, the term "Contractor" shall mean [contractor one name], any successor to [contractor one name] located on facility, [contractor two name], any successor to [contractor two name] located at Defendant's facility and contractors providing the following services at the facility: [list of specific services such as asbestos removal; demolition; painting; waste handling, including vacuum truck operators; and construction].

18. Confidential Business Information ("CBI") - Defendant may, if appropriate, declare portions of the EMS Manual, rationale or underlying information, to be confidential pursuant to 40 C.F.R. Part 2.